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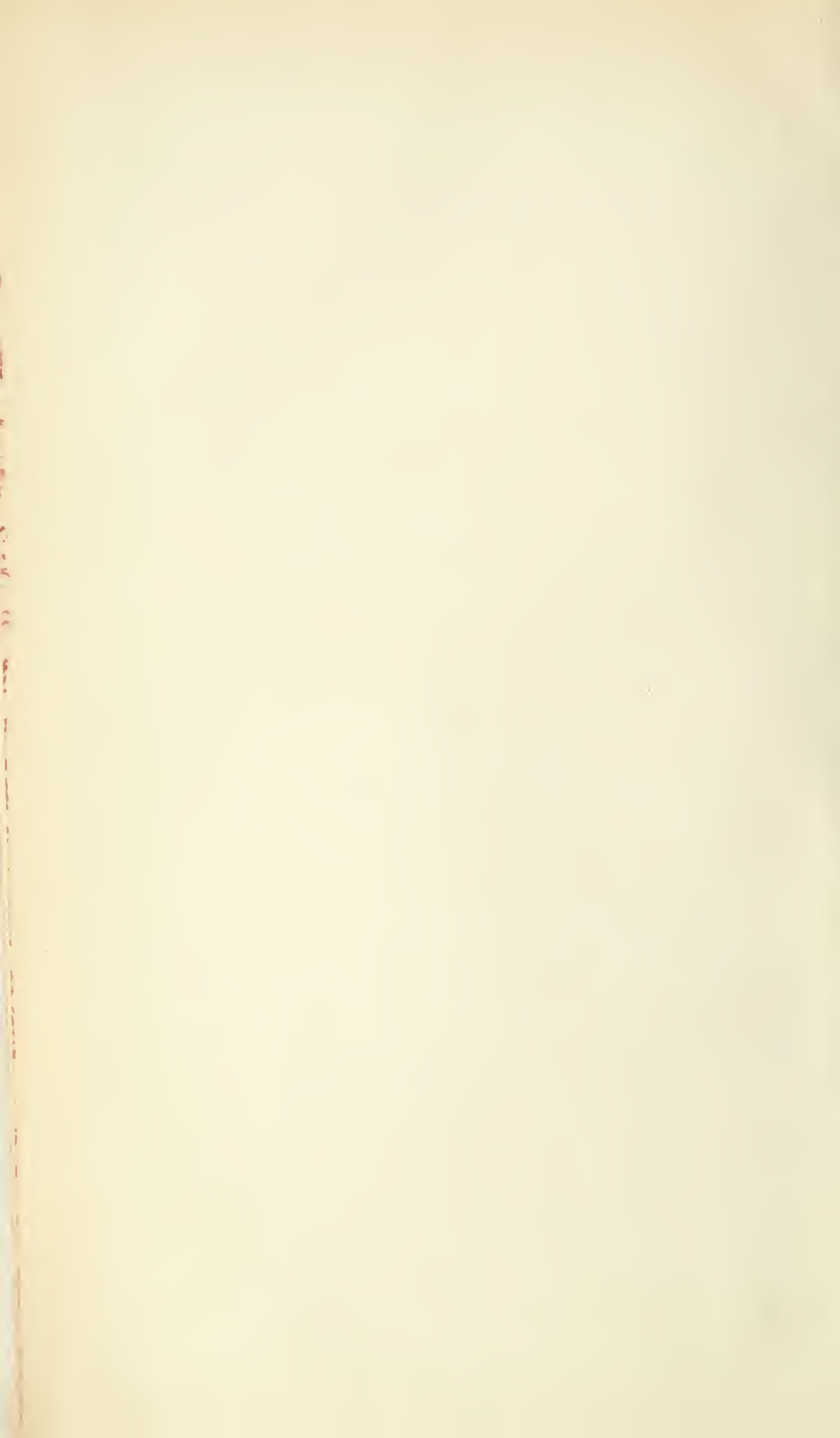










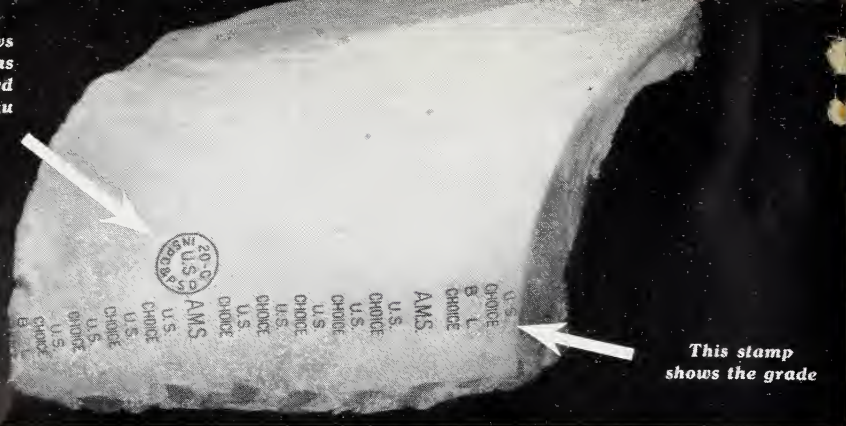


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# Federal BEEF Grading

U. S. DEPARTMENT OF AGRICULTURE  
AGRICULTURAL MARKETING SERVICE  
MISCELLANEOUS PUBLICATION Nº 391

This stamp shows  
that the meat was  
inspected and passed  
by the U. S. Bureau  
of Animal Industry



This stamp  
shows the grade

● Beef cut clearly labeled

SOME commodities, such as automobiles, are bought on the basis of "price class." From experience, people who buy these articles have learned to recognize, in general, the quality they may expect from the price paid.

But price is not a dependable guide to quality when buying beef or other farm products. To the inexperienced buyer, most beef looks alike, although there is great variation in quality. That is why an increasing quantity of beef is being graded and stamped—to help wholesalers, retailers, and housekeepers to select beef with confidence. And consumer preferences are reflected back, through wholesale and retail prices, to the livestock market and to producers.

Many improvements have been made in the program since the Federal beef-grading and stamping service was started in 1927. Each year the service has expanded as more people have become familiar with the grade names and as more distributors and users of beef have learned the value of the grade stamp as an indicator of quality.



# FEDERAL BEEF GRADING

By the Agricultural Marketing Service

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**B**EEF shows a wide variation in quality. That is why the term "beef" alone has no significance from the standpoint of relative desirability. But the Government grade stamp, on carcasses and retail cuts, indicates that a trained specialist has carefully appraised the meat in the light of rigid Federal standards of quality and ascertained its grade. The stamping is done with a harmless vegetable compound which usually disappears during the cooking of the meat.

The beef grades are simple and easily learned. In the order of their general desirability they are: Prime, Choice, Good, Commercial, Utility, Cutter, and Canner. The specifications for these grades are uniformly applied throughout the country and from season to season.

● Choice, Good, Commercial.



## HOW FEDERAL GRADING CAME ABOUT

**S**LAUGHTERING cattle and selling meat were at one time largely local enterprises. The retailer or "butcher" bought meat "on the hoof" and did his own slaughtering. The meat was sold over the counter with no particular designation as to quality. Beef grading during the evolution of the industry was almost unknown. And grading, as it is practiced today, was not vitally important in the merchandising process, for most consumers were already familiar with the quality of meat handled by the local butcher.

But as the meat-packing industry developed along present-day lines, the slaughterers and the consumers tended to become more widely separated. More and more livestock were slaughtered close to the areas of production, and the meat was shipped in refrigerated railroad cars to the large consuming centers for sale and distribution. Since an individual retailer usually could not handle an entire carlot of meat, the wholesaler took over the function of buying in large lots from the slaughterer, or packer, and of selling in small lots to the individual retailers.

The increasing complexity of the marketing process made it impracticable for the buyer personally to inspect the meat he purchased. The wholesaler in New York City who wished to buy a carload of meat found it was too expensive to travel to Kansas City or Omaha to examine the meat he intended to buy. To a lesser extent, many retailers found it a nuisance to go to the wholesaler's warehouse to inspect the meats before buying. This need for some practical means of describing quality as a substitute for the presale examination of the meat led to the use of numerous descriptive terms having some quality significance.

## EARLY GRADE TERMS

**T**HESE early grade terms emphasized the geographical origin of the cattle. Beef produced from cattle originating in one locality possessed characteristics associated with that particular area. The term "native," for example, was applied to beef from cattle originating in the Corn Belt States. "Western" beef was produced from cattle originating in the range States. These broad classifications were further segregated to show narrower ranges of quality, such as "choice," "good," and "medium" natives, and as "choice," "good," "medium," and "common" westerns.

As the production of cattle became somewhat more specialized, however, the terms "native" and "western" tended to lose their significance. Cattle originating in the range States, but fed in the

Corn Belt for varying periods of time, lost their original characteristics to some degree. Likewise, cattle grazed and fed extensively in the range States produced beef somewhat comparable with that from cattle fed in the Corn Belt.

Notwithstanding the changing character of the cattle industry, many of the original terms remained, though the meaning of the terms used was not uniform in all sections. Beef described as "good native" by one packer might be called "choice western" by another, for each slaughterer had his own system of grading. As the grade terms grew more and more complicated, it became increasingly apparent that a nationally understood uniform standard was needed in order that beef might be graded regardless of origin.

### **SIMPLIFICATION ATTEMPTED**

**P**ROBABLY the first attempt to collect, harmonize, define, and interpret the numerous grade terms used to describe meat was made in 1902 by the Agricultural Experiment Station of the University of Illinois. The results of those studies were used in setting up tentative standards for classes and grades of beef, prepared by the United States Department of Agriculture about 1916, and first used in market news reporting work.

Revisions have been made in the early grade classifications to keep them in line with consumer demands and production practices. The tentative standards were first revised in 1923, when Federal grading was started as a special service to United States Steamship Lines. And in 1926, after numerous public hearings, they were further revised and were issued as the official United States standards for grades of carcass beef.

### **BEEF GRADING AND STAMPING**

**T**HE official standards for grades were first put into commercial use in 1927. In that year the Better Beef Association, an organization made up in the main of livestock producers and feeders interested in promoting the sale of high-quality beef, arranged with the national packers, the National Livestock and Meat Board, and the United States Department of Agriculture for the grading and stamping of beef on the basis of the official standards. It was believed that this assurance of quality, indicated to consumers by the stamp, would broaden the demand for beef of the better grades—which at that time was in abundant supply and was selling at relatively low prices—and would prevent substitution of lower quality beef for that of the better grades.



Arrangements for inaugurating the grading and stamping of beef on an experimental basis were made at Boston, New York City, Philadelphia, Washington, Chicago, Omaha, and Kansas City. Actual work was started May 2, 1927. It was agreed that it was to be limited to the Prime and Choice grades of steer and heifer beef. In January 1928 it was extended to include the Good grade of steer and heifer beef. The service was later broadened to include beef of all classes and grades.

After meat grading became better known, and slaughterers, wholesalers, retailers, and consumers increased their orders for Government graded and stamped beef, a number of slaughterers and wholesalers requested the grading of beef in advance of orders from purchasers. Thus, Government graded and stamped beef became available to retailers and other purchasers to the extent that individual selections could be made from entire rails of beef which previously had been officially graded, and which bore the official U. S. grade stamp.

### **GRADING PLACED ON FEE BASIS**

**D**URING the experimental period this service was conducted without expense to the applicant, as the cost was paid from a congressional appropriation for research and demonstration. In late June 1928, when the experimental period ended, the grading work was placed on a fee basis. The fee was \$2 per hour for the time required for the work, including that consumed in travel from the grader's official station to the place of grading and return.

The success attained during the 14 months of experimental work had established the practicability of the service, and placing it on a fee basis did not materially diminish requests made for it. The grading and stamping of beef soon became a part of the regular grading and certification activities of the United States Department of Agriculture.

### **"SINGLE STANDARD" ADOPTED IN 1939**

**B**EEF is now being graded and stamped in accordance with the revised standards which became effective in July 1939. The revisions were made to simplify the grades, to make it easier for consumers to buy beef on the basis of its quality or grade. The name of the class, such as steer, heifer, and cow, was eliminated from the grade stamp.

Under the old system a Choice or a Good piece of beef might have been Choice or Good steer, or Choice or Good heifer, or Choice or



Good cow, the latter being of a decidedly poorer quality than the other two. Under the present "single standard" system, the grade name alone is indicative of the quality. Now consumers may select the grade of beef suitable for their purposes regardless of how limited their knowledge may be of the factors that determine the grades. All they need do is to familiarize themselves with one series of grade names—Prime, Choice, Good, Commercial, and Utility—and with their relative position in the grade scale.

It is recognized that class is a factor affecting cutting yield and, therefore, is significant in wholesale transactions. The revised standards for grades consequently provide for recording class on the wholesale grading certificates. Furthermore, because of the wide range of wholesale prices within the grades that include the bulk of beef sold as carcass beef—the Choice, Good, and Commercial grades—provision is made for the division of these grades into half-grade designations and for the recording of the half grades on the wholesale grading certificates.

## **THE GRADES OF BEEF**

**T**HE grades of carcass beef and wholesale cuts are Prime, Choice, Good, Commercial, Utility, Cutter, and Canner. The Cutter and Canner grades are seldom sold in retail stores as "block" beef. It is, therefore, necessary for retailers and consumers to become familiar with the names and characteristics of only the first five grades.

Beef is graded on the basis of those characteristics that determine its value and that provide the best indication of its ultimate worth to the consumer.

The grade factors that are considered the most dependable criteria in evaluating the relative merit of the beef to consumers are the degree of marbling, the texture, grain, and color of the cut surface of the lean meat. These factors are, therefore, of greatest significance in meat grading.

Experience and research studies indicate that there is a relationship between degree of fatness, or finish, and the relative merit of beef to consumers. The quantity of fat is also closely related to the extent of marbling and to the grain and texture of the lean meat. Careful consideration is given to the amount, distribution, and character of the exterior, interior, and intermuscular fat.

The proportion of edible meat to bone in a carcass side or cut depends largely on its build or shape. Conformation is, therefore, an additional important factor to be considered in determining grade.

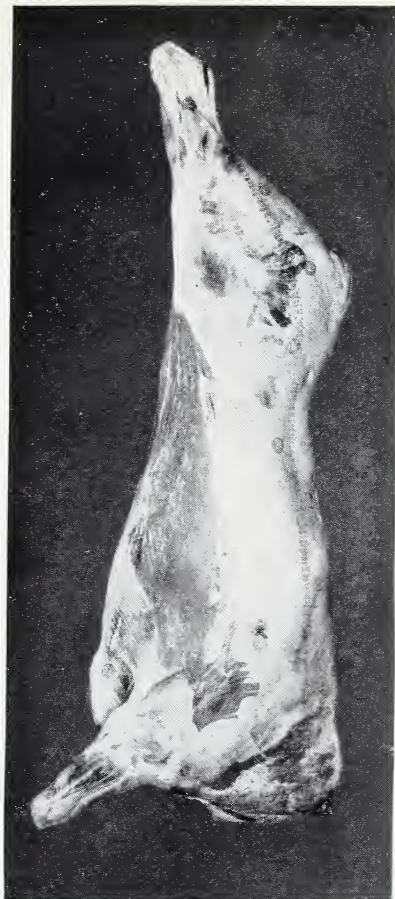


● Choice.



● Good.

● The grade name appears



● Commercial.



● Utility.



## **Prime**

Prime is the highest grade of beef. It is available in limited quantities during the late fall and early winter following livestock shows, and usually in very limited quantities for the remainder of the year. Loin and ribs of this grade are in demand by exclusive hotels, restaurants, and clubs. Retail cuts are frequently very fat, and the removal of considerable excess fat is necessary before the cuts are acceptable to the consumer. Prime beef is produced wholly from steers and heifers that represent the highest degree of perfection in breeding and that have been specially fed for a long period. Only a small percentage of all cattle, however, produce beef that attains the degree of perfection necessary to grade Prime.

## **Choice**

Choice is the highest grade of beef available regularly throughout the year in the Middle West and East and is usually available in limited quantities in the West. It is the highest grade sold regularly throughout the year in retail meat markets in middle western and eastern cities. It is usually considered satisfactory for the most discriminating retail trade. Retail cuts are usually relatively fat and require considerable trimming. Choice grade beef is produced from steers and heifers that have been intensively fed for a relatively long period on concentrated feed.

## **Good**

Good is the highest grade of beef sold in volume throughout the year in practically all of the principal beef-consuming centers. This grade is adapted for sale in retail stores whose customers desire to purchase relatively high-grade beef but whose food budget will not justify the purchase of beef that requires extensive trimming before being served. Good grade beef is produced largely from steers and heifers that have been fed intensively on concentrated feed for varying lengths of time. It carries sufficient fat for the average consumer. And it is of sufficiently high quality to satisfy the requirements of consumers who demand high-quality meat but insist on a minimum of fat and a moderate price.

## **Commercial**

Commercial grade beef constitutes a relatively large percentage of production. It is adapted for sale in retail markets whose customers demand and can afford to buy only a moderately high quality of beef and whose food budgets necessitate the purchase of beef that has very little excess fat. Appropriate cuts of this grade may not prove to be as satisfactory for steaks or oven roasts as those of the higher grades,

but the cuts that are adapted for cooking in moist heat, such as pot roasting and stewing, may be expected to be quite satisfactory. This grade of beef is produced from steers and heifers, and relatively young cows that are sufficiently well finished to produce beef of comparable quality. Commercial grade beef is produced mostly from steers and heifers that have been fed largely on grass or roughage and that have been intensively fed on concentrated feed for only a short time.

### **Utility**

Utility grade beef is the lowest grade usually sold as "block" beef. It is well adapted for sale in retail stores located in areas where consumers' incomes are such that they find it necessary to purchase relatively low-priced meat. Appropriate cuts of this grade are not satisfactory for broiling or oven roasting. They are, however, satisfactory for pot roasting, stewing, and the preparation of other economical meat dishes. Utility grade beef is produced from steers and heifers that usually have been fed either largely or entirely on grass or roughage and from cows that are not too old and are sufficiently well fattened to be suitable for sale in the retail trade as "block" beef. Cows that are discarded from dairy herds or range herds, when advanced in age, do not usually produce beef that is of sufficiently high quality for the Utility grade.

### **GRADING AND STAMPING PROCEDURE**

**F**EDERALLY stamped beef can be found in practically all the large cities and in many towns from coast to coast. The actual grading, however, is done in cities and plants where the amount of money collected in fees for the grading has been sufficient to maintain the work on a self-supporting basis.

Graders are now available in Baltimore, Boston, Chicago, Cincinnati, Cleveland, Columbus, Des Moines, Detroit, Indianapolis, Kansas City, Los Angeles, National Stock Yards, Ill., New York City, Oklahoma City, Omaha, Philadelphia, Phoenix, San Francisco, Seattle, St. Joseph, St. Louis, St. Paul, Washington, Waterloo, and Wichita.

The graders are subject to call every weekday by packers, wholesalers, retailers, or others who have a financial interest in the meat. Under favorable conditions one grader is able to grade more than 50 carcasses in an hour. The cost, at the rate of \$2 per hour, varies in proportion to the number of carcasses or cuts offered for grading and stamping. Where only relatively small quantities are done each time the grader makes a trip to the plant, the cost per carcass is greater than in plants where large quantities are graded and it is necessary for the grader to call less frequently. The minimum charge for the service is \$1.

The grade stamp is applied to the carcass or cut by the official grader, or by an employee of the plant under the immediate supervision of the official grader. The use of the stamp by anyone else is prohibited. When carcasses are stamped, the roller is first applied to the hind shank, and by a continuous rolling motion it is carried down the length of the side along the thick part of the back to the neck. One other imprint of the roller is made on the thick part of the forequarter, from the thin end of the rib to the fore part of the shoulders. Thus the presence of the grade mark on all of the principal retail cuts is assured. (This roller or grade stamp should not be confused with the round stamp which also appears on the principal cuts. The round stamp indicates that the meat has been federally inspected and passed for food.) Names or trade marks of packers or dealers may be shown in conjunction with the Government grade stamp. This arrangement enables packers to identify their own meat and to utilize their established brands in connection with its sale. At the same time they provide their customers with meat that is federally graded.

### **QUALIFICATIONS OF GRADERS**

**M**EAT grading requires a high degree of skill. Often the line of demarcation between Prime and Choice is extremely narrow. Years of experience in handling carcass beef and careful training in the application of the official standards enable the graders to make these fine distinctions. Since the reputation of the beef-grading service rests almost entirely upon the shoulders of the individual graders, it is not surprising that the Department of Agriculture insists upon certain rigid qualifications for its meat graders.

The official graders must each have had at least 6 years of responsible and practical commercial experience in beef grading, beef buying, or beef selling before being appointed. After appointment, a grader is carefully trained in the correct application of the standards for each grade during a 12-month probationary period. After the training period, the work of each grader is checked at frequent periods by supervisors in order to prevent possible deviations from the correct interpretation of the standards. As a consequence, a high degree of efficiency and uniformity has been attained.

### **BENEFITS OF BEEF GRADING**

**U**NIFORM standards, and the uniform application of those standards, facilitate the marketing of beef. When each grade of beef is identified by the grade stamp, homemakers are able to obtain the quality of beef best suited for their use. The availability of

federally graded beef in retail stores increases consumer confidence in dealers and in the products they sell. Public institutions and public dining rooms find it practicable to purchase beef according to specifications based on the Federal grades. Wholesalers who buy in large quantities and at long distances find that the Federal standards provide a means of getting a specified quality of beef without personal examination of purchases. From the standpoint of slaughterers, a uniformly graded product tends to eliminate dissatisfaction and complaints, and lessens the need for arbitration and price adjustments. And producers tend to benefit from the savings brought about by the increased efficiency of the marketing process, and from any stimulation of beef consumption that may result from the availability of a quality-identified product.

### **Homemakers Assured of Uniform Quality**

**T**HOUGH beef actually possesses an unusually wide range of quality, compared with other meats, to many persons all beef looks much the same. In the absence of any definite means of identification, beef is frequently bought for the table on hope or guess, rather than with any degree of certainty. But homemakers who habitually buy beef that has been federally graded and stamped may expect a reasonably uniform degree of satisfaction with their purchases.

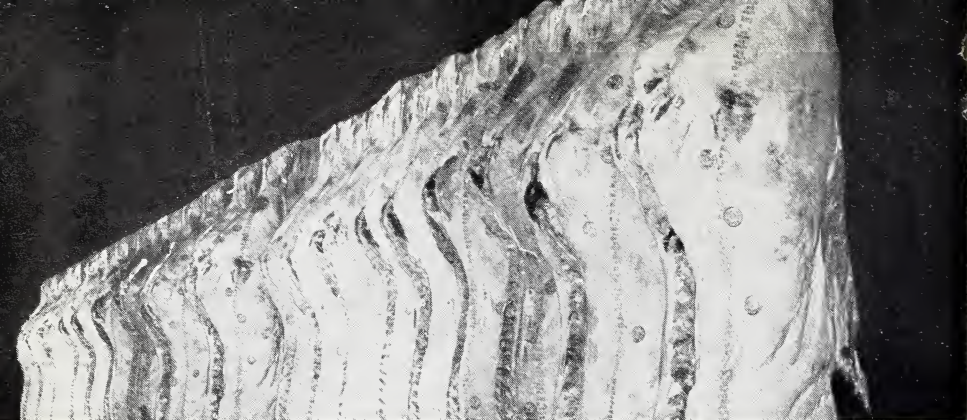
The meat-grading and stamping service provides consumers with quality-identified beef. If consumers learn the range of the grades and find the table use to which each grade of beef is best fitted, they can buy the quality they want without the need of advice or suggestion. The purchase of graded beef, however, is only the first step in assuring ultimate consumer satisfaction. It is necessary that cuts be selected that are well adapted to the use for which they are intended, and it must be remembered that even the highest quality of beef will not be satisfactory unless it is properly cooked.

Graded and stamped beef is handled by slaughterers so located over the country that practically all dealers can buy it. The retailer or "butcher" can supply his customers by ordering the stamped beef from his wholesaler.

### **Retailers Gain Consumers' Confidence**

**T**O CONDUCT a profitable business the retailer needs the confidence of the consuming public. In this respect, probably nothing helps quite so much as the sale of products that bear identifiable Federal grade stamps—marks that signify dependable quality.





● Graded carcasses in coolers

This grade identification raises the standard of retail meat merchandising in general and increases consumer confidence in dealers and in the products they sell. That the official grade stamp on beef is the Department's certification of quality is becoming generally understood throughout the country. Because of the assurance of dependability which this stamp carries, fair selling prices can be applied to graded and stamped meats.

Retailers themselves have more confidence in the product they sell when they handle graded beef. In addition, they are able to place orders without having to visit packers' coolers, as the trade now recognizes that the quality represented by an official grade name is always uniform within practicable limits. This means a saving of time and expense and contributes to greater efficiency in operation.

### **Facilitates Large-Scale Purchasing**

**P**URCHASING agents for Federal, State, city, and county institutions find in the meat-grading service an aid in establishing and maintaining dietary standards, as purchases may be made according to standardized grade terms. Definite specifications based on the official standards may be prepared, and meat requirements bought on the basis of competitive bids or contracts that require the meats to be graded and identified by Federal graders as conforming to the purchasers' specifications. The many purchasing agents for public institutions who are using the service report that it results in economy and convenience.

It is essential that hotel and restaurant operators—purchasers of large quantities of beef—maintain a high degree of uniformity in quality. Success in the operation of a dining room depends to a large extent upon pleasing patrons, and many people judge a dining room on the basis of the quality of meat served. The operator can decide upon the grade of beef he wishes to serve, and by purchasing meat stamped by Government graders he can be sure of obtaining beef of the desired quality.



### Grade Stability for Slaughterers and Wholesalers

AS THE grading and stamping are done by an impartial Federal agency, and according to standards of quality that do not change from season to season, practical uniformity is achieved. A uniformly graded product, especially if indicated by a label or other identification mark, tends to eliminate dissatisfaction and complaints, and lessens the need for arbitration and price adjustments. When price adjustments do become necessary, official standards for grades and their application by Federal graders who do not have a financial interest in the beef provide a definite basis for settlement.

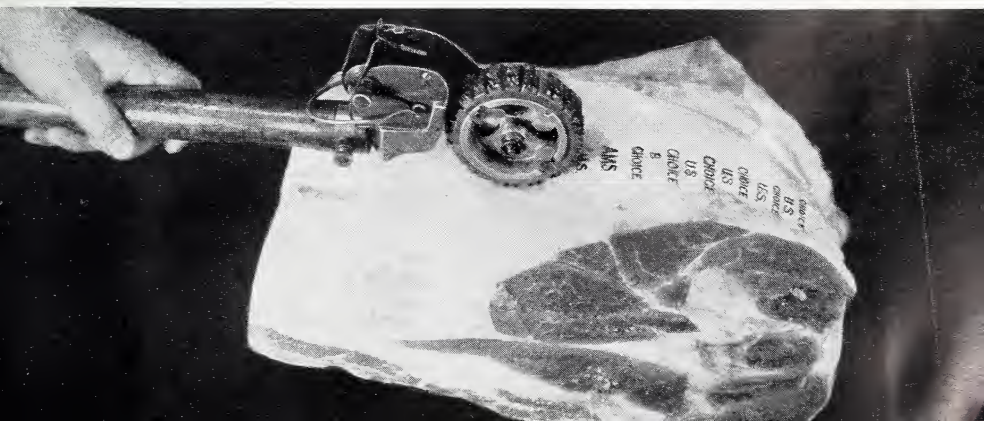
When beef that has not been graded and stamped is sold to buyers in distant cities without the personal inspection of the buyer, as is frequently the case, and prices decline while the meat is en route, it may be rejected on arrival on the basis that it is not of the grade specified by the seller. Likewise, if prices advance between the time the sale is made and the beef is shipped, the seller may substitute beef of lower grade than was agreed upon when the sale was made. The purchase or sale of officially graded and stamped beef does away with the possibility of substituting lower grade beef and the dissatisfaction resulting therefrom.

## Producers Benefited Indirectly

**G**RADING and stamping beef according to uniform standards result in marketing economies by making the personal inspection of purchases unnecessary. The savings that grow out of this increased efficiency in the marketing process tend to be reflected back to cattle producers as a group. And the extent to which grading and stamping increase the consumption of beef by building up consumer confidence may result in some increase in the amount of money spent for beef.

Producers of high-grade beef are also benefited in that the service helps prevent the substitution of low-grade beef. The selection of beef is based on grade, and consumers thus establish prices on the basis of what they are willing to pay for each grade. These prices are reflected back through the retail, wholesale, and livestock markets to the producer and thus facilitate the sale of the producer's product—live cattle—on the basis of what consumers will pay for the quantity and quality of beef produced.

- Stamping wholesale cu



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